

Title (en)

METHOD FOR MAKING A THIN FILM OF SOLID MATERIAL, AND USES THEREOF

Title (de)

REALISIERUNGSMETHODE EINER DÜNNSCHICHT AUS FESTEM MATERIAL UND ANWENDUNG DIESER METHODE

Title (fr)

PROCEDE DE REALISATION D'UN FILM MINCE DE MATERIAU SOLIDE ET APPLICATIONS DE CE PROCEDE

Publication

**EP 0902843 A1 19990324 (FR)**

Application

**EP 97924080 A 19970513**

Priority

- FR 9700842 W 19970513
- FR 9606085 A 19960515

Abstract (en)

[origin: WO9743461A1] A method for making a thin film of optionally crystalline solid material selected from a dielectric material, a conductive material, a semi-insulating material and an unordered semiconductor material. The method comprises an ion implantation step wherein a substrate of the solid material is bombarded with ions selected from rare gas and hydrogen gas ions in order to form a layer of microcavities in the body of the substrate at a depth adjacent to the average ion penetration depth, and thus divide the substrate into two areas; and a heat treatment step wherein the microcavity layer is heated to a temperature high enough to cause separation of the two areas of the substrate either naturally or by means of an applied stress. The method is useful for producing a ferroelectric capacitor storage.

IPC 1-7

**C23C 14/00**; **C23C 14/58**; **C23C 14/48**

IPC 8 full level

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CPC (source: EP KR US)

**C23C 14/00** (2013.01 - KR); **C23C 14/48** (2013.01 - EP KR US); **C23C 14/58** (2013.01 - KR); **H01L 21/76254** (2013.01 - EP US); **H01L 28/55** (2013.01 - EP US); **H10B 53/00** (2023.02 - EP US); **H10B 53/30** (2023.02 - EP US)

Citation (search report)

See references of WO 9743461A1

Cited by

US7229899B2; US7772087B2; US7439092B2; US7615463B2; US7670930B2; US7176108B2

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